

In The Name of God

Curriculum Vitae



I: Personal Data

Name: Saeed
Surname: Aminzadeh
Nationality: Iranian
Date of birth: 13 January 1975
Place of birth: Mashhad / Iran
Present position: Associate Professor

II: Contact Information

Address: Bioprocess Engineering Research Group; Institute of Industrial and Environmental Biotechnology (IIEB), National Institute of Genetic Engineering and Biotechnology (NIGEB), Shahrak-e Pajooresh Km 15, Tehran-Karaj Highway, Tehran-Iran.

P.O. Box: 14965/161

Tel: (+98) 21 44787412

Fax: (+98) 21 44787399

Email: aminzade@nigeb.ac.ir or aminzadeh.saeed@yahoo.com

Web page:

http://scholar.google.com/citations?hl=en&user=ewjpykAAAAJ&view_op=list_works&sortby=pubdate

III: Academic Qualification

1. **Diploma** in natural science, Mashhad, Iran 1992.
2. **B.Sc.** in Biology at Ferdowsi University of Mashhad, Iran 1993-97.
3. **M.Sc.** in Biochemistry at Tarbiat Modarres University, Tehran/Iran 1998-2000.
4. **Ph.D** in Biochemistry, at Tarbiat Modarres University, Tehran/Iran 2001-2006.

IV: Dissertation

1. **M.Sc:** Genetic Variation Within and Among Rainbow Trout, *Onchorhynchus mykiss*, Hatchery Populations from Iran Assessed by PCR-RFLP Analysis of Mitochondrial DNA Segments.
2. **Ph.D:** Isolation, Purification and Biochemical Characterization of a Pectinase Produced from Native Microorganisms.

V: Position

1. **Assistant Professor (2007):** R&D center, Pasteur Institute of Iran, Tehran, Iran.
2. **Assistant Professor (2008):** Bioprocess Engineering Research Group; Institute of Industrial and Environmental Biotechnology (IIEB), National Institute of Genetic Engineering and Biotechnology (NIGEB), Tehran, Iran.
3. **Associate Professor (2015):** Bioprocess Engineering Research Group; Institute of Industrial and Environmental Biotechnology (IIEB), National Institute of Genetic Engineering and Biotechnology (NIGEB), Tehran, Iran.
4. **Director Biotechnology Development Center: 2017-now**
5. **A member of NIGEB Publication Committee: 2017-now**

VI: Papers Published in Scientific Journals

1. R.H.Sajedi, **S. Aminzadeh**, H.Naderimanesh, M.Sadeghizadeh, H.Abdolhay, M.Naderimanesh. Genetic Variation Within and Among Rainbow Trout, *Onchorhynchus mykiss*, Hatchery Populations from Iran Assessed by PCR-RFLP Analysis of Mitochondrial DNA Segments. **JOURNAL OF FOOD SCIENCE**. Vol. 28, 2003.
2. **S. Aminzadeh**, H.Naderimanesh, K.Khajeh, M.Naderimanesh. Purification, Characterization, Kinetic Properties and Thermal Behavior of the Extracellular Polygalacturonase Produced by a Filamentous Fungus *Tetracoccusporium* sp. **Applied Biochemistry and Biotechnology**. Vol. 135, 2006.
3. **S. Aminzadeh**, H.Naderimanesh, K.Khajeh, M.R. Soudi. Isolation and Characterization of Polygalacturonase Produced by *Tetracoccusporium* sp. **Iranian Journal of Chemistry and Chemical Engineering**. Vol. 26, 2007.
4. **S. Aminzadeh**, H.Naderimanesh, K.Khajeh, B.Ranjbar, N. Farrokhi. Characterization of Acid-Induced Partially Folded Conformation Resembling a Molten Globule State of Polygalacturonase from a Filamentous Fungus *Tetracoccusporium* sp. **Applied Biochemistry and Biotechnology**. Vol. 160, 2010.
5. M. Zarei, **S. Aminzadeh***, H. Zolgharnein, A. Safahiye, A. Ghoroghi, A. Motallebi, M. Daliri, A.S. Lotfi. Chitinase Production by *Serratia marcescens* B4A: Parameters Optimization Using Taguchi Approach. **Iranian Journal of Biotechnology**. Vol. 8, 2010.
6. M. Zarei, **S. Aminzadeh***, H. Zolgharnein, A. Safahiye, M. Daliri, K. Akbari Noghabi, A. Ghoroghi, A. Motallebi. Characterization of a chitinase with antifungal activity from a native *Serratia marcescens* B4A. **Brazilian Journal of Microbiology**. (2011) 42: 1017-1029.
7. O. Esmailipour, M. Shivazad, H. Moravej, **S. Aminzadeh**, M. Rezaeian and M. M. van Krimpen. Effects of Xylanase and Citric Acid on the Performance, Nutrient Retention, and Characteristics of Gastrointestinal Tract of Broilers Fed Low Phosphorus Wheat Based Diets. 2011 **Poultry Science** 90 :1975–1982
8. S. Babashpour, **S. Aminzadeh***, N. Farrokhi, M. Khosroshahli, M. Keshvarz. Isolation and Cloning of Chitinase Gene from *Serratia marcescens* B4A from Shrimp Farming. **Journal of Veterinary Microbiology**, Islamic Azad University, Garmsar Branch. Vol 7, Issue 1, 2011, No 22.
9. S. Mirzaei, M. Zaghari, **S. Aminzadeh***, M. Shivazad. Intestinal enzyme activity and nutrient digestibility response to wheat inclusion and xylanase supplementation in the diet of laying hens at first phase of production. **Iranian Journal of Biotechnology**. Vol. 10, No. 3, July 2012.
10. S. Babashpour, **S. Aminzadeh***, N. Farrokhi, K. Haghbin, A. Karkhane. Characterization of a Chitinase (Chit62) from *Serratia marcescens* B4A and its efficacy as a bioshield against plant fungal pathogens. **Biochemical Genetics**. (2012) 50:722–735.
11. Effects of Diet Acidification and Xylanase Supplementation on Performance, Nutrient Digestibility, Duodenal Histology and Gut Microflora of Broilers Fed Wheat Based Diet. O. ESMAEILIPOUR, H. MORAVEJ, M. SHIVAZAD, M. REZAIAN, **S. AMINZADEH**, M. M. VANKRIMPEN. **British Poultry Science**. Volume 53, Number 2 (April 2012), pp. 235—244
12. Effects of wheat inclusion and xylanase supplementation of the diet on productive performance, nutrient retention, and endogenous intestinal enzyme

- activity of laying hens. S. Mirzaie, M. Zaghari, **S. Aminzadeh**, M. Shivazad, and G. G. Mateos. **Poultry Science**. 2012; 91 :413–425.
13. Characterization of the newly isolated *Geobacillus* sp. T1, the efficient cellulase-producer on untreated barley and wheat straws. Assareh, R., Shahbani Zahiri, H., Akbari Noghabi, K., **Aminzadeh, S.**, Bakhshi khaniki, G. **Bioresource Technology**. Volume 120, September 2012, Pages 99-105.
 14. Culture optimization, purification and evaluation of antifungal activity of thermophilic bacteria *Cohnella* A01. Naghmeh Abiri, **Saeed Aminzadeh***, Mohammad Reza Bihamta. **Genetic Engineering and Biosafety Journal**. Volume 1, Issue 1, pages: 15-22. (2012)
 15. Chitinase Isolated from Water and Soil Bacteria in Shrimp farming Ponds. Mandana Z, **Aminzadeh S.***, Ghoroghi A., Motalebi A.A., Alikhajeh J., Daliri M. Chitinase Isolated from Water and Soil Bacteria in Shrimp farming Ponds. **Iranian Journal of Fisheries Sciences**. 2012, 11(4) 911-925.
 16. Structural comparison between collagen isolated from sea cucumber *Holothuria parva* and calf skin collagen Type I. Adibzadeh, N., **Aminzade, S.***, Jamili, S.3 Mostafavi, P. **New Cellular and Molecular Biotechnology Journal**. Volume 2, Number 6 (6-2012).
 17. Dietary fibers and crude protein content alleviate hepatic fat deposition and obesity in broiler breeder hens. M. Mohiti-Asli, M. Shivazad, M. Zaghari, **S. Aminzadeh**, M. Rezaian, and G.G. Mateos. 2012 **Poultry Science** 91: 3107–3114.
 18. Effects of feeding regimen, fiber inclusion, and crude protein content of the diet on performance and egg quality and hatchability of eggs of broiler breeder hens. M. Mohiti-Asli, M. Shivazad, M. Zaghari, M. Rezaian, **S. Aminzadeh**, and G. G. Mateos. 2012 **Poultry Science** 91: 3097–3106.
 19. In Silico and Experimental Characterization of Chimeric *Bacillus thermocatenulatus* Lipase with the Complete Conserved Pentapeptide of *Candida rugosa* Lipase. Hosseini, M., Karkhane, A.A., Yakhchali, B., Shamsara, M., **Aminzadeh, S.**, Morshedi, D., Haghbeen, K., Torktaz, I., Karimi, E., Safari, Z. **Applied Biochemistry and Biotechnology**. (2013) 169:773–785.
 20. Physicochemical study of a novel chimeric chitinase with enhanced binding ability. S. Matroodi, M. Zamani, K. Haghbeen, M. Motallebi, and **S. Aminzadeh**. **Acta Biochim Biophys Sin** (Shanghai). 2013 Oct;45(10):845-56.
 21. Product optimization, purification and characterization of a novel polygalacturonase produced by *Macrophomina phaseolina*. **S. Aminzadeh**, N. Farrokhi. **Biological Journal of Microorganism** 1st Year, Vol. 1, No. 4, Winter 2013.
 22. Study of the effect of F17A mutation on characteristics of *Bacillus thermocatenulatus* lipase expressed in *pichia pastoris* using *in silico* and experimental methods. E. Karimi, AA. Karkhane, B. Yakhchali, M. Shamsara, **S. Aminzadeh**, I. Torktaz, M. Hosseini, Z. Safari. **Biotechnology and Applied Biochemistry**. DOI: 10.1002/bab.1164. 2014.
 23. S. Mirzayi, M. Zaghari, **S. Aminzadeh***, M. Shivazad. The effect of the non-starch polysaccharides levels on intestinal enzyme activity and performance of laying hens. **Journal of Cellular and Molecular Researches** (Iranian Journal of Biology). Volume 26, Issue 4. Pages: 562-571, 2014.
 24. Purification and characterization of pepsin solubilized collagen from skin of sea cucumber *Holothuria parva*. Nasim Adibzadeha, **Saeed Aminzadeh***, Shahla

- Jamili, Ali Asghar Karkhane, Naser Farrokhi. **Applied Biochemistry and Biotechnology**. 173:143–154. 2014.
25. Evaluation of Gene Expression Changes of Serotonin Receptors, 5-HT₃AR and 5-HT₂AR as Main Stress Factors in Breast Cancer Patients. Seyed Hesam Hejazi, Ghasem Ahangari, Majid Pornour, Abdolkhalegh Deezagi, **Saeed Aminzadeh**, Hamid Reza Ahmadkhaniha, Mohamad Esmail Akbari. **Asian Pac J Cancer Prev**, 15 (11), 4455-4458. 2014.
 26. Protein Engineering of *Bacillus thermocatenulatus* Lipase via Deletion of the α 5 Helix. Nastaran Goodarzi & Ali Asghar Karkhane & Aghafakhr Mirlohi & Fatemeh Tabandeh & Ibrahim Torktas & **Saeed Aminzadeh** & Bagher Yakhchali & Mehdi Shamsara & Mozhddeh Al-Sadat Ghafouri. (2014) **Applied Biochemistry and Biotechnology**. 174:339–35.1. DOI 10.1007/s12010-014-1063-3
 27. Isolation and identification of the first indigenous bacterial strain against *Xanthomonas citri* subsp. *citri* causal agent of citrus canker disease. Dariush Gholami, **Saeed Aminzadeh***, Syed Mehdi Alavi, Tannaz Goodarzi, Nasrin Kazemipour, Jafar Valizadeh. **Journal of Cellular and Molecular Researches** 27 (1) 111-118. 2014.
 28. Identification and studying of *Enterobacter* sp. DGH3 antibacterial activity. Dariush Gholami, **Saeed Aminzadeh***, Syed Mehdi Alavi, Nasrin Kazemipour, Jafar Valizadeh, Tannaz Goodarzi. **Journal of Cellular and Molecular Researches** 27 (2) 269-276. 2014.
 29. Biocontrol of Causative Agent of Citrus Canker Disease Using Antimicrobial Substances Produced by *Aspergillus awamori* K-03. Sara Kazemzadeh, Naser Farrokhi, **Saeed Aminzadeh**, Seyed Mehdi Alavi, Abolfazl Masoudi, Mojtaba Mamarabadi, Tannaz Goodarzi. **Biological Journal of Microorganism**. 3rd Year, No. 11, 91-99. Autumn 2014.
 30. Cloning, expression, purification, and characterization of lipase 3646 from thermophilic indigenous *Cohnella* sp. A01. Bahram pooreydy Golaki, **Saeed Aminzadeh***, Ali Asghar Karkhane, Parisa Farrokhi, Seyed Hossein Khaleghinejad, Asal Akhavian Tehrani, Sina Mehrpooyan. (2015) **Protein expression and purification**. 109: 120–126. DOI: 10.1016/j.pep.2014.10.002
 31. Effects of feeding strategy on reproductive performance and ovarian morphology of broiler breeder hens. Maziar Mohiti-Asli, Mahmoud Shivazad, Mojtaba Zaghari, Maryam Rezaian, and **Saeed Aminzadeh***. (2014) **Journal of Cellular and Molecular Researches** 27 (3) 418-427.
 32. Significant Association between Catechol Amine O-Methyl Transferase (COMT) Gene Expression Changes and Breast Cancer Pathogenesis. Ghasem Ahangari, Majid Pornour, **Saeed Aminzadeh**, Hossein Bakhtou and Hamid Reza Ahmadkhaniha. (2015) **Carcinogenesis & Mutagenesis**. Volume 6. Issue 2. <http://dx.doi.org/10.4172/2157-2518.1000219>
 33. Cloning, expression and characterization of chimeric *Bacillus Thermocatenulatus* Lipase in *E.coli*. Khaleghinejad S.H, Karkhane A.A, Motalleb G.R, **Aminzadeh S**, Yakhchali B2, Pooreydy B. **Journal of Cellular and Molecular Researches**. 2015, Volume 28, Issue 2, 202-210.
 34. Study of active site adjacent residues on *Serratia marcescens* B4A chitinase catalytic activity. Emruzi Tubkanlu Z., **Aminzadeh S.***, Karkhane A.A., Alikhajeh J. **Journal of Cellular and Molecular Researches**. 2015, Volume 28, Issue 3.

35. The Effect of pH on Globular State of Lipase-3646; an Appropriate Model for Molten Globule Investigations. Bahram Pooreydy Golaki, **Saeed Aminzadeh***, Ali Asghar Karkhane, Bagher Yakhchali, Parisa Farrokh, Ferdous Rastgar Jazii, Mohammadsadegh Nadimifar. **The Protein Journal**. DOI 10.1007/s10930-015-9622-1
36. A Nested-Splicing by Overlap Extension PCR Improves Specificity of this Standard Method. AA Karkhane, B Yakhchali, F Rastgar Jazii, B Bambai, **S Aminzadeh**, **Iranian Journal of Biotechnology**. Volume 13, Issue 2, Spring 2015, Page 56-59. DOI: 10.15171/ijb.1090
37. Bacterial secretome analysis in hunt for novel bacteriocins with ability to control *Xanthomonas citri* subsp. *Citri*. D Gholami; T Goodarzi; **S Aminzadeh***; SM Alavi; N Kazemipour; N Farrokhi, **Iranian Journal of Biotechnology**. **Iranian Journal of Biotechnology**. 2015 September;13(3): e1123. DOI:10.15171/ijb.1123
38. Toward the development of a single-round infection assay based on EGFP reporting for anti-HIV-1 drug discovery. Mahdiah Soezi, Arash Memarnejadian, **Saeed Aminzadeh**, Rezvan Zabihollahi, Seyed Mehdi Sadat, Safieh Amini, Soheila Hekmat, Mohammad Reza Aghasadeghi. **Reports of Biochemistry & Molecular Biology** Vol.4, No.1, Oct 2015.
39. Antimicrobial effects of *Trichoderma harzianum* crude extract and its efficacy in biocontrol. Kazemzadeh S., Farrokhi N., **Aminzadeh S.**, Alavi S.M., Sarpele A., Mamarabadi M. **Journal of Cellular and Molecular Researches**. 2015, Volume 28, Issue 1, 107-114.
40. Thermostable chitinase from *Cohnella* sp. A01: isolation and product optimization. Aliabadi, N. **Aminzadeh, S***. Karkhane, A. A., Haghbin, K. **Brazilian Journal of Microbiology**, 2016. 47, 931–940. <http://dx.doi.org/10.1016/j.bjm.2016.07.009>.
41. Extraction of a polygalacturonase from *Macrophomiona phaseolina* and analysis of its stability. E Fahimi Bayrami, N Farrokhi, **S Aminzadeh*** **Journal of Cellular and Molecular Researches**; 2016, 29 (2), 252-268
42. Study the effect of F17S mutation on the chimeric *bacillus thermocatenulatus* lipase. Khaleghizejad, H. Motalleb, G., Karkhane, A. A., **Aminzadeh, S.** Yakhchali , B. **Journal of Genetic Engineering and Biotechnology**, 2016, 14 (1), 83-89
43. Optimization of culture condition of *Enterobacter* ZS extra cellular cyanide degrading enzyme with Response Surface Methodology. Z Javaheri Safa, **S Aminzadeh***, MR Zamani, M Motalebi **Journal of Cellular and Molecular Researches**, 2016, 29 (3), 265-272.
44. Optimization of simultaneous production of tyrosinase and laccase by *Neurospora crassa*. S. Moshtaghiuni, M. Dadkhah, K. Bahremandjo, K. Haghbeen, **S. Aminzadeh** & R. L. Legge. **Biocatalysis and Biotransformation**, 2017; Early Online: 1–10
45. The effect of different levels of citrus dry pulp and pectinase on performance of broilers. Z. Niknafas, O. Esmailipour, R. Mirmahmoudi, **S. Aminzadeh** **Research on Animal Production**. 2017. Accepted.
46. *Cohnella* amylopullulanases: Biochemical characterization of two recombinant thermophilic enzymes. FZ Roodi, **S Aminzadeh***, N Farrokhi, AA Karkhane, K Haghbeen. **PloS one**. 2017. 12 (4), e0175013.
47. Evaluation of oxidative enzymes for efficient oxidation of aniline and phenolic pollutants. F. Mirazizi, A. Bahrami, S. Soleimani Asl, A. Zaribafan, K.

- Haghbeen, S. Aminzadeh. **International Journal of Environmental Science and Technology**. First Online: 07 August 2017.
48. Significant increase in cyanide degradation by *Bacillus* sp. M01 PTCC 1908 with response surface methodology optimization. ZJ Safa, S Aminzadeh*, M Zamani, M Motallebi, **AMB Express**, 2017, 7 (1), 200.
 49. Effect of Pectinase and Dried Citrus Pulp on Performance, Nutrient Digestibility and Intestinal Characteristics of Broiler Chickens. Z Niknafs Deghani, O Esmaeilipour, R Mirmahmoudi, S Aminzadeh. **Research on Animal Production**, 2017 8 (16), 21-28.
 50. Recombinant Chitinase produced from a thermophilic *Paenibacillus* sp. A01. M Motazavi, S Aminzadeh*, A Ghanbari, N Farrokhi, A Karkhane. **Journal of Cellular and Molecular Researches**, 2017, 30 (2), 182-190.
 51. Protective or Deteriorative Effect of Zinc Ions on Protein Misfolding: A New Insight into Amyloidogenic Disease. S Noorzadeh, MR Dayer, S Aminzadeh. **Jentashapir Journal of Health Research**, 2017 ; 8(4):e64461. [doi: 10.5812/jjhr.64461](https://doi.org/10.5812/jjhr.64461).
 52. Biochemical Characterization of Recombinant Thermostable *Cohnella* sp. A01 β -Glucanase. M Rezaie, S Aminzadeh*, F Heidari, M Mashhadi Akbar Boojar. **Iranian biomedical journal**, 2018 Sep; 22(5): 345–354. doi: [10.29252/ibj.22.5.345](https://doi.org/10.29252/ibj.22.5.345)
 53. Comparison of antibiotics and bacteriocins antibacterial activity on *Xanthomonas citri subsp.citri*. Gholami D; Aminzadeh S*; Alavi S. M.; Kazemipour N; Ghoroghi A.; Emrouzi Z. **Iranian Journal of Fisheries Sciences**. 2018, 17 (1), 162-178.
 54. Heterologous expression and characterization of a recombinant thermostable amylopullulanases Coh4159 from *Cohnella* sp. A01. P Valiulahi, S Aminzadeh*, M Shamsara, N Farrokhi, J Alikhajeh. **Advanced Researches in Microbial Metabolites & Technology**. 2018, 1, 31-38.
 55. Improving the thermostability of *Serratia marcescens* B4A chitinase via G191V site-directed mutagenesis. Z Emruzi, S Aminzadeh, AA Karkhanea, J Alikhajeh, K Haghbeen, D Gholami. **International Journal of Biological Macromolecules**. 2018, Volume 116, Pages 64-70. <https://doi.org/10.1016/j.ijbiomac.2018.05.014>

VII: Papers Published in Scientific Promotion Journals

1. The role of miRNAs in detection and treatment of multiple sclerosis (MS). Mahdokht Eilbayg, Saeed Aminzadeh. **Laboratory Diagnosis**, 2015, 117, 40-44.
2. Investigate the genes involved in the afflictions of the retinoblastoma (Rb). Parisa Babrahmati, Saeed Aminzadeh. **Laboratory Diagnosis**, 2015, 116, 15-17.
3. Relationship between smoking and disorders genetics and epigenetic and lung cancer. Fereshteh Moheb-afzali, Saeed Aminzadeh. **DNA alzahra-magazine**, 2105, 3-7.
4. Regulatory T cell: an overview. Soheila Mansoori, Saeed Aminzadeh. **Laboratory Diagnosis**, 2015, 117, 45-47.
5. Application of magnetic nano-fluid in targeted drug delivery in cancer treatment. Sadaf Bondar, Saeed Aminzadeh. **Laboratory Diagnosis**, 2015, 118, 29-31.

6. Steroid hormone receptor status and its impact on breast cancer prognosis. Faezeh Kholousi-Adab, **Saeed Aminzadeh**. **DNA alzahra-magazine**, 2015, 10-14.
7. Hemoglobin A1c an Overview. Anita Ahmadi, **Saeed Aminzadeh**, Maryam Amirjalali. **Laboratory Diagnosis**, 2015, 116, 26-31.
8. Urine Microalbumin. Anita Ahmadi, **Saeed Aminzadeh**, Maryam Amirjalali. **Laboratory Diagnosis**, 2016, 120, 44-45.
9. Telomeres, telomerase and their relationship with cancer and aging. Parima Safarpour, **Saeed Aminzadeh**. **Laboratory Diagnosis**, 2016, 122, 42-43.
10. Cancer immunotherapy. Parima Safarpour, **Saeed Aminzadeh**. **Laboratory Diagnosis**, 2016, 122, 38-39.
11. Liver function tests. Anita Ahmadi, **Saeed Aminzadeh**, Maryam Amirjalali. **Laboratory Diagnosis**, 2016, 126, 43-45.
12. Application of hyaluronic acid in medicine. F Fotuhi, **S Aminzadeh**, F Tabandeh, V Jafariyan. **Laboratory Diagnosis**, 2016, 129, 22-23
13. Sequencing the DNA of all life on Earth. M Shafiei Darabi, **S Aminzadeh** **Iranian Journal of Biology** (Biological Science Promotion) 2017, 1 (1), 91-93.
14. Mycoplasma Hominis in men and women infertility. J Khosravai Babadi, **S Aminzadeh**. 2017 **Laboratory Diagnostics** 142, 30-31.
15. The role of hyaluronan in cancer development. F Fotouhi, **S Aminzadeh***, V Jafariyan, F Tabandeh, M Khodabandeh. **Laboratory Diagnosis**, 2017, 141, 21-23.
16. The Therapeutic Potential of Snake Poison in the Treatment of Cancer. N Saedi, **S Aminzadeh**. **Laboratory Diagnosis**. 2018, 145, 29-33.
17. Alzheimer; Destruction of brain cells in absolute silence. D Taabodi, **S Aminzadeh**. **Laboratory Diagnosis**. 2018, 147, 30-33.

VIII: Book Translation, Edition & compiling

1. **Biotechnology Foresight: Iran 2025**. ISBN: 978-964-8041-41-5, Pub Date: 2009. (Publisher: National Research Institute for Science Policy).
2. **Stryer's Biochemistry 1&2**; fourth Edition. ISBN: 964-95647-1-3, Pub Date: 2006. (Publisher: Biology House).
3. **Stryer's Biochemistry**; Fifth Edition. Pub Date: 2007. (Publisher: Biology House).
4. **Stryer's Biochemistry 1 & 2**; sixth Edition. Pub Date: 2007. (Publisher: Biology House).
5. **Biology of SOLOMON**; Seventh Edition 2006. (Publisher: Biology House).
6. **Biology Olympiads for high school students 1&2**. (Publisher: kanoon farhangi amoozesh).
7. **Questuion Designer of Biology Teachers Exam**. September 2008
8. **Biology Olympiads of IRAN**. 2008 (publisher: kanoon farhangi amoozesh).
9. **Membrane Biochemistry and transfer**. 2010 (publisher: Textbooks compiled center, department of education and training, Sepah e Pasdaran).
10. **Campbell Biology**. 9th. Ed. 2011. (Publisher: Biology House).
11. **Quality in Medical Biochemistry Laboratory**. 2015 (publisher: Nour e Ata).
12. **Gene Cloning and DNA Analysis an Introduction**. 2015 (Sixth Edition, publisher: Roodgon and Sinateb)
13. **Emery Elements of Medical Genetics**. 2015 (Sixth Edition, publisher: Roodgon and Sinateb)

14. **Molecular Cell Biology, Lodish, Harvey F.** 2018. (publisher: Roodgon and Sinateb)

IX: Patent

1. Application of *Cohnella* A01 thermophilic lipase in detergent and leather industries.
2. Single step purification of *Macrophomina phaseolina* polygalacturonase.
3. The process of cyanide degradation by *Bacillus subtilis* M01.
4. Heat shock single step purification of *Cohnella* A01 recombinant protease 1147.
5. The process of phenolic derivative oxidation by thermophilic laccase from *Cohnella*

X: Presentation

1. Investigation of Genetic Variation within and Among *Rainbow Trout, Onchorhynchus mykiss*, Hatchery Populations from Iran. The first Congress of Biochemistry and Biophysics. I.B.B. 2000.
2. Screening of fungal strains for pectinolytic activity. The 13th Iranian Congress of Biology & the 1st International Congress of Biology. Gilan-Iran, 2005.
3. Purification, Characterization, Kinetic Properties and Thermal Behavior of the Extracellular Polygalacturonase Produced by a Filamentous Fungus *Tetracoccusporium* sp. International Congress of Biochemistry. TMU, Iran, 2006.
4. Characterization of Acid-Induced Molten Globule State of Polygalacturonase from a Filamentous Fungus *Tetracoccusporium* SP. FEBS 2006 Congress.
5. A survey on chitinolytic bacteria in shrimp farming ponds; 1st International Congress on Aquatic Animal Health Management and Diseases; 2009; Tehran; IRAN.
6. Screening of chitinolytic microorganism in shrimp farming water and wastewater; 27th Meeting of The European Society of veterinary pathology and European college of veterinary pathologists. Olsztyn-Krakow 09-13 September 2009.
7. S. Aminzadeh, A. Ghoroghi, M. Zarei, S.A. Lotfi, M. Daliri, H. Zolgharnain, S. Alireza. Screening of Chitinolytic Microorganisms in Shrimp Farming Water and Wastewater. Journal of Comparative Pathology. Vol. 141, 2009.
8. Screening, Isolation and Optimization of Chitinase Produced from a Native Strain of Iran; Sixth Congress of Biotechnology. 2009; Tehran; IRAN.
9. Possibility of achieving thermophile chitinolytic microorganisms in shrimp farming ponds. The first National Congress of Veterinary Laboratory Sciences. December 1-2 2009 Tehran, IRAN.
10. Molecular Identification of mesophilic chitinolytic microorganisms in shrimp farming ponds and partial purification of produced chitinase. The first National Congress of Veterinary Laboratory Sciences. December 1-2 2009 Tehran, IRAN.
11. Cloning of chitinase gene obtained from one of the isolated chitinolytic microorganism in shrimp farming ponds. The first National Congress of Veterinary Laboratory Sciences. December 1-2, 2009 Tehran, IRAN.
12. Purification of Chitinase from Native *Enterobacter cloacae* B4A. The 3rd Iranian Proteomics Society Congress, May 2010.
13. Functional Genomics of a Mesophilic Chitinase Isolated from Shrimp Pond. The 3rd Iranian Proteomics Society Congress, May 2010.

14. Thermophilic Chitinase Production by *Geobacillus thermodenitrificans* A01: Parameters Optimization Using Taguchi Approach. The 16th National and 4th International Conference of Biology, Sept 14-16, 2010, Ferdowsi University of Mashhad, Iran.
15. Purification and Characterization of Chitinase from *Serratia marcescens* B4A. The 16th National and 4th International Conference of Biology, Sept 14-16, 2010, Ferdowsi University of Mashhad, Iran.
16. Heterologous Expression and Structural Investigation of Chitinase from the Chitinolytic Bacterium *Serratia marcescens* B4A. The 16th National and 4th International Conference of Biology, Sept 14-16, 2010, Ferdowsi University of Mashhad, Iran.
17. Thermophilic Chitinase Production by *Geobacillus thermodenitrificans* A01: Parameters Optimization Using Taguchi Approach. The 16th National and 4th International Conference of Biology, Sept 14-16, 2010, Ferdowsi University of Mashhad, Iran.
18. Biochemical Characterization and Optimization of Thermostable Chitinase Produced by *Geobacillus Thermodenitrificans* A01. 1st International Conference of Bio-Processing and Application of Microbial Biotechnology in Agriculture, Nov 1-3, 2010, Cairo, Egypt.
19. Kinetic Properties and Biochemical Characterization of a Native Antifungal Chitinase. 1st International Conference of Bio-Processing and Application of Microbial Biotechnology in Agriculture, Nov 1-3, 2010, Cairo, Egypt.
20. Molecular Cloning, Expression, Characterization and Purification of Chitinase from *Serratia marcescens* B4A as a Biological Control. 1st International Conference of Bio-Processing and Application of Microbial Biotechnology in Agriculture, Nov 1-3, 2010, Cairo, Egypt.
21. Purification and Characterization of *Serratia Marcescens*. The Third International Conference of Medical Genetics in Kuwait, October 2010.
22. Chitinase pI Determination and Investigation of Carbon Resources on *Serratia marcescens* B4A Proteome by 2 dimensional Gel Electrophoresis. The National Proteomics Congress, Shiraz University, 28 & 29 October 2010.
23. Production, Purification, and Optimization of Chitinase in order to Remove Shrimp Farming Waste. 3rd Iranian Shrimp congress. Boushehr University, 5 & 6 December 2010.
24. Identification of antifungal chitinase from *Serratia marcescens* B4A. 11th Iranian Congress of Biochemistry and Molecular Biology. Qazvin University, 8-10 February 2011.
25. Efectos De La Inclusión De Trigo Y Suplementación Con Xilanasas Del Pienso Sobre La Actividad Enzimática Intestinal, La Retención De Los Nutrientes Y La Productividad En Gallinas De 25 A 33 Semanas De Edad. Asociación Interprofesional Para El Desarrollo Agrario (Aida). 41 Jornadas De Estudio. Xiv Jornadas Sobre Producción Animal. 17 Y 18 De Mayo De 2011. Zaragoza.
26. Screening and Isolation of Polygalacturonase from Plant pathogen microorganisms. The First National Probiotic & Prebiotic Congress of Iran. 20 and 21 May 2011.
27. Partial Purification of Thermostable Chitinase from a Native Microorganism. The First National Probiotic & Prebiotic Congress of Iran. 20 and 21 May 2011.
28. Production of Recombinant Protein from Izumo Spermatozoid. The 7th National Biotechnology Congress of I.R.Iran. 12-14 sep. 2011.

29. Screening of plant pathogenic fungi for the isolation of polygalacturonases important in fruit juice factories. The 7th National Biotechnology Congress of I.R.Iran. 12-14 sep. 2011.
30. Production and Partial Purification of Extracellular Chitinase with Antifungal activity from a Native Thermophile Strain of Iran. The 7th National Biotechnology Congress of I.R.Iran. 12-14 sep. 2011.
31. Cloning and sequencing of thermophilic chitinase gene of a native Iranian bacteria. The 7th National Biotechnology Congress of I.R.Iran. 12-14 sep. 2011.
32. Isolation and Characterization of Collagen from Skin of sea cucumber (*Holothuria parva*). The 7th National Biotechnology Congress of I.R.Iran. 12-14 sep. 2011.
33. Construction of single-cycle replicable HIV-1 virions expressing GFP reporter protein. The 5 Iranian Congress of clinical Microbiology. Shiraz Medical University. 2011.
34. Purification, Characterization, Kinetic Properties, and Thermal Behaviour of Extracellular Chitinase Produced by a Native Microorganisms *Serratia marcescens* B4. IV International Conference on Environmental, Industrial and Applied Microbiology (BioMicroWorld2011). Spain. 2011.
35. Recognition testing for a novel bacteriocin produced by native *Serratia marcescens* DGH1. 1st Biotechnology World Congress. U.A.E. 2012.
36. A new method for survey antibacterial activity agents against of pathogenic Microorganisms. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
37. Optimal production of bacteriocin produced by *Enterobacter* DGH3 an anti-Citrus canker bacteria. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
38. Screening and Isolation of Anti citrus canker disease bacteria from soil, water and plant organs. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
39. Identification and partial investigation of Antibacterial activity of native *Enterobacter* sp. DGH3. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
40. Characterization and investigation of antifungal chitinase from native *Serratia marcescens* B4A. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
41. SERRATIA MARCESCENS B4A ANTI PATHOGENIC PLANT FUNGAL CHITINASE STABILITY IMPROVEMENT. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
42. A new method for survey antibacterial activity of bacteriocins for improvement plant products. The 17th National and 5th International Conference of Biology, September, 2012, Bahonar University of Kerman, Iran.
43. Purification of polygalacturonase of *Macrophomina phaseolina*, causal agent of Charcoal rot. 12th Iranian Genetic Congress. 21-23 May 2012.
44. Stabilization of a chitinase from *Serratia marcescense* B4A by change of Ser390Ile with site directed mutagenesis. 12th Iranian Genetic Congress. 21-23 May 2012.
45. Isolation and purification of protein and peptide from gel polyacrylamide. 12th Iranian Genetic Congress. 21-23 May 2012.

46. Recombinant protein generation against canis sperm. 12th Iranian Genetic Congress. 21-23 May 2012.
47. Effect of Wheat Inclusion and Xylanase Supplementation of the Diet on Intestinal Enzyme Activity and Nutrient Digestibility in Laying Hen at First Phase of Production. Proceedings of the 15th AAAP Animal Science Congress. Thailand. 2012.
48. Isolation and identification of antagonistic effects of some fungal crude extract on xanthomonas species. Third National Biotechnology Congress. Ferdowsi University of Mashhad. 2012.
49. Serotonin receptor, 5-HTR2A gene expression changes analysis as stress factor in Breast cancer patients. 8th International Congress of Breast Cancer. 21-23 Feb. 2012
50. Analysis of biochemical characteristics of fungal polygalacturonases via bioinformatics. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
51. Isolation and cloning of thermophile beta glucanase from *Cohnella* A01. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
52. Fungal and bacterial polygalacturonases: A bioinformatic survey. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
53. Isolation and Cloning of Amylopullulanase Gene from *Cohnella* A01. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
54. Bioinformatic of thermophilic bacteria Glucanase enzyme *Cohnella* A01. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
55. Isolation and cloning of beta 1,6 glucanase gene from native thermophilic *Cohnella* A01. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
56. Isolation and Cloning of Amylopullulanase Gene 04159 from *Cohnella* A01. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
57. Type II pullulanases (GH57) in archaea and bacteria: A bioinformatic survey. The 8th National Biotechnology Congress of I.R.Iran. 6-8 July. 2013.
58. The bioinformatics evaluation of amylopullulanase in archaea, bacteria and plants. The first National Student Congress of Bioscience. 25, 26 September 2013.
59. Serotonin receptor, 5-HTR2A gene expression changes analysis as stress factor in Breast cancer patients. 8th International Congress of Breast Cancer. 20-22 Feb 2013.
60. The association between rs11568818 polymorphism with the risk of relapsing-remitting multiple sclerosis in Iranian patients. 6th Iranian International Congress Laboratory & Clinic. 12-14 Feb 2014.
61. Bioinformatic analysis of fungal and bacterial pectate lyase L towards better comprehension of its biochemical properties. 1st International & 13th Iranian Genetics Congress. 24-26 May 2014.
62. Gene cloning of pectate lyase isolated from *Cohnella* A01. 1st International & 13th Iranian Genetics Congress. 24-26 May 2014.
63. Comparative modeling of a β -Galactosidase from *Cohnella* A01 and performing in silico point mutation for increasing thermal stability and catalytic activity. 1st International & 13th Iranian Genetics Congress. 24-26 May 2014.
64. Cloning and expression of Beta glucanase enzymes isolated from thermophilic bacteria *Cohnella* A01. 1st International & 13th Iranian Genetics Congress. 24-26 May 2014.

65. Type II Pullulanase of a thermostable bacterial *Cohnella* A01: study of catalytic and non-catalytic domain. 1st International & 13th Iranian Genetics Congress. 24-26 May 2014.
66. Production of recombinant amylopullulanase Coh00831 from *Cohnella* A01. 1st International & 13th Iranian Genetics Congress. 24-26 May 2014.
67. Industrial Enzymes. The Comprehensive Novel findings in National Congress Biology. 7-8 May 2014.
68. Biodegradation of cyanide by nitrilase. 1st National Congress of Biology and Natural Sciences. 11 Dec 2014.
69. Prediction of secondary structure of pectate lyase from *Cohnella*A01 with PSIPRED server. First International and 9th National Biotechnology Congress. 24-26-2015.
70. Theoretical Study of Indigenous Beta-1,3-1,4-glucanase. First International and 9th National Biotechnology Congress. 24-26-2015.
71. The Comparison between native thermostable amylopullulanase with the other related enzymes. First International and 9th National Biotechnology Congress. 24-26-2015.
72. Isolation, Screening and Identification of Cyanide Degrading Enzymes. First International and 9th National Biotechnology Congress. 24-26-2015.
73. Bioinformatics analysis of iron dependent superoxide dismutase in thermophilic bacterium *Cohnella* sp.A01. First International and 9th National Biotechnology Congress. 24-26-2015.
74. In Silico Survey of Native Thermostable Laccase. First International and 9th National Biotechnology Congress. 24-26-2015.
75. Cloning and Molecular Confirmation of Lipase gene from *Xanthomonas citri* Subsp. Citri. First International and 9th National Biotechnology Congress. 24-26-2015.
76. Theoretical prediction properties of Peptidase T Coh03367.n from Thermophile bacteria *Cohnella* sp A.01. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
77. Theoretical prediction properties of Zinc metalloprotease Coh02397.n from Thermophile bacteria *Cohnella* sp A.01. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
78. Bioinformatic analysis of *Cohnella* A01 glutamin amidotransferase. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
79. Theoretical prediction properties of carboxypeptidase G2 Coh01302.n from Thermophile bacteria *Cohnella* sp A.01. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
80. Theoretical prediction properties of Putative carboxypeptidase yodJ Coh02594.n from Thermophile bacteria *Cohnella* sp A.01. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
81. The bioinformatic study of thermostable protease. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
82. In Silico studies of indigenous thermostable protease. 1st Congress of Chemical Biotechnology. 6-8 March 2016.
83. The prevalence of changes in the HLA-A * 31: 01 gene by administration of carbamazepine to different Iranian ethnic groups. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.

84. Investigation of the relationship between MS and rs9657904 on gene CBLB. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.
85. Comparison between glutamin amidotransferases in four bacteria via bioinformatics software. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.
86. Bioinformatics analysis of carboxypeptidase G2 Coh01302.n from Thermophile bacteria *Cohnella* sp A.01. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.
87. Characterization of thermostable and Ca²⁺ independent amylopullulanase from Indigenous bacteria *Cohnella* sp. A01. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.
88. Optimization of culture condition of the extra cellular cyanide degrading enzyme with Response Surface Methodology. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.
89. Homology modeling of *Cohnella* A01 thermostable protease. 2nd International & 4th Iranian Genetic Congress. 21-23 May 2016.
90. The effect of metal ions on *Cohnella* A01 thermostable protease. 5th Iranian Congress of Trace Elements. 20-22 Dec. 2016.
91. The effect of metal ions on *Cohnella* A01 thermostable cellulase. 5th Iranian Congress of Trace Elements. 20-22 Dec. 2016.
92. HA-producing Non-recombinant GRAS Bacteria. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
93. Study on urease localization produced by Staphylococcus sp. IR-103 and its time profile of urease activity in various culture media. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
94. Design, Expression and Purification of Recombinant Peptide Derived from Human Endostatin. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
95. Cloning a Novel Indigenous Bacterial L-Glutaminase. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
96. From determining a key membrane protein to treatment a specific disease. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
97. Cloning and Expression of xylanase A from thermophilic indigenous *Cohnella* sp. A01. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
98. Isolation and Cloning of Xylanase B from a Native Thermophilic Bacteria from Shrimp Farming Ponds. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
99. Cloning and sequencing of xylanaseB from Thermophilic *Cohnella* sp.A01. 2nd International and 10th National Biotechnology Congress of Islamic Republic of Iran. August 29-31, 2017.
100. Effect of post-hatch feeding on trend of gastrointestinal tract development in broiler chickens. 8th Iranian Animal Science Congress. 28-29 August 2018. University of Kurdistan.

101. Effect of post-hatch nutrition in modulating transport stress in broiler chickens. 8th Iranian Animal Science Congress. 28-29 August 2018. University of Kurdistan.
102. Effect of post-hatch feeding on performance of broiler chickens. 8th Iranian Animal Science Congress. 28-29 August 2018. University of Kurdistan.

XI: Teaching Experiences

1. **General Biochemistry** Course; Islamic Azad University of Mashhad.
2. **Biochemistry** Course; Islamic Azad University of Mashhad.
3. **Hormones Biochemistry**; Islamic Azad University of Mashhad.
4. **Carbohydrates & Lipids Biochemistry**; Islamic Azad University of Mashhad.
5. **Protein and Nucleic acid Biochemistry**; for M.Sc Students; Payame Noor University of Mashhad; Noor e Danesh university of meymeh.
6. **DNA Structure and Replication**; for M.Sc Students; National Institute of Genetic Engineering and Biotechnology, Tehran.
7. **Gene Regulation**; for M.Sc Students; National Institute of Genetic Engineering and Biotechnology, Tehran, M.Sc Student of Islamic Azad University and M.Sc Students; Noor e Danesh university of meymeh.
8. **Advanced Molecular Genetics II**; for Ph.D Students; National Institute of Genetic Engineering and Biotechnology, Tehran.
9. **Biotechnology**; for M.Sc Students; National Institute of Genetic Engineering and Biotechnology, Tehran.
10. **Biochemistry** Course; for M.Sc Students; Payame Noor University of Tehran.
11. **Enzymology** Course; for M.Sc Students; National Institute of Genetic Engineering and Biotechnology (NIGEB), Shahed University, and M.Sc Student of Islamic Azad University; Noor e Danesh university of meymeh.
12. **Biotechnology** Course; for Ph.D Students of veterinary sciences; Tehran University, Tehran.
13. **Molecular and Cellular Biology** Course; for M.Sc Students; Payam Noor University of Karaj.
14. **Microbiology** Course; for M.Sc Students; Payam Noor University of Karaj.
15. **Eukaryotes genetics** Course; for M.Sc Students; Noor e Danesh university of meymeh; M.Sc Students; National Institute of Genetic Engineering and Biotechnology, Tehran.
16. **Biochemistry**; for M.Sc Students; National Institute of Genetic Engineering and Biotechnology, Tehran.
17. **Advanced Topics in Protein and Nucleic acid Biochemistry**; for Ph.D students; Islamic Azad University, Science and Research Branch, Tehran.
18. **Advanced Topics in Protein Structure**; for Ph.D students; Islamic Azad University, Science and Research Branch, Tehran.
19. **Mechanism of Enzyme Action**; for Ph.D students; Islamic Azad University, Science and Research Branch, Tehran.

XII: Special Training

1. May 2008. A Member of Executive Committee in International Workshop on “Application of Advanced Molecular Methods for Diagnosis of Human Genetic Diseases” Organized by: National Institute of Genetic Engineering and Biotechnology, Tehran, Iran; Supported by: international center for Genetic Engineering & Biotechnology (ICGEB).
2. June 2008. Workshop on “Bioinformatics & Protein Engineering” National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.

3. June 2008. Workshop on “New Molecular, Cytogenetic, and Molecular Cytogenetic Methods and their applications for Diagnosis of Human Genetic, Agriculture, and Veterinary Diseases” National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
4. June 2008. International Workshop on “Genomic Engineering and Nanobiotechnology” National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
5. August 2008. Workshop on “Experimental Design and optimization of Biotechnology Processes using Statistical Methods-basic course” National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
6. January 2009. First International Congress on “Aquatic Animal Health Management and Disease”, Tehran, Iran.
7. March 2009. Workshop on “The Trade & Transfer of Intellectual Property in the Biotechnology Industry” National Institute of Genetic Engineering and Biotechnology and Em Tec, Tehran, Iran.
8. October 2010. Workshop on “Phylogenetic tree” National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
9. February 13-14, 2011. International Training Workshop on “Technology Business Incubators (TBIs) Management”. Isfahan Science Technology Town, Isfahan, Iran.
10. November 20-22, 2011. 1st International Workshop on “Bioethics and Ethical Aspects of Biosafety”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
11. April 2011. Workshop on “Enzyme engineering”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
12. October 2011. Workshop on “Intellectual properties for startup companies”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
13. November 2011. Workshop on “International patents”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
14. January 2012. Workshop on “ASTM E691 Standard”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
15. May 2012. Workshop on “Project Management”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
16. August 2012. Workshop on “Estimated measurement uncertainty”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
17. December 2012. Workshop on “Iso/IEC 17025 Standard”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
18. December 2013. Workshop on “SOP writing, Validation & business negotiation and communication”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
19. March 2013. Workshop on “Minitab Software”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
20. May 2015. Workshop on “Commercialization”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
21. July 2015. Workshop on “Technology Transfer”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
22. June 2015. Workshop on “Intellectual Properties”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
23. June 2015. Workshop on “Technology Management”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.

24. June 2015. Workshop on “Technology Transfer Contracts”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
25. October 2015. Workshop on “Basic life support”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
26. September 2016. Workshop on “Introduction to NGS data analysis”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
27. July 2016. Workshop on “Risk Management ISO 14971:2012”. QS Quality Service.
28. October 2016. Workshop on “Promotion of Scientific and Technological Authority at the National and International Levels: Effective Strategies and Applicable Solutions”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
29. December 2016. Workshop on “Technology Transfer and Commercialization in OIC Member States: The Role of TechMart”. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.

XIII: Techniques of Expertise

Laboratory skills:

- Gene expression analyses (RNA&DNA extraction, Southern and Northern blot, RT-PCR, Screening)
- Recombinant protein expression and purification in prokaryotes
- RFLP.
- Site-directed mutagenesis techniques.
- **Protein Purification:** Purification of proteins, FPLC purification of proteins using ion-exchange, size-exclusion, and affinity columns.
- Structural characterization
- **Chromatography:** FPLC purification of proteins using DEAE, SEC and Affinity columns.
- **Protein analysis:** Protein extraction, SDS PAGE analysis, Enzyme assays.
- **Spectrophotometry:** UV/Vis, Fluorometry, Circular Dichroism.
- **Enzymatic manipulation.**
- **Product Optimization.**
- **Protein Engineering**
- **Bioinformatics**

XIV: Professional Membership

1. **Sep. 1995 – Present:** Member of Iranian Biology Society.
2. **Sep. 2001 – Present:** Member of Iranian Society of Biophysical Chemistry.
3. **Sep. 2001 – June 2008:** Biotech Committee High-Tech Ctr., Ministry of Industry and Mines.
4. **May 2010 – Present:** Member of Iranian Biotechnology Society.

XV: Editorial Board

1. **2013-present:** Iranian Journal of Biotechnology (IJB)
2. **2013-present:** Journal of Cellular and Molecular Researches
3. **2016-present:** Iranian Journal of Biology (biological Science Promotion)

XVI: Invited Reviewer

1. **2008 - Present:** Iranian Journal of Biotechnology
2. **2009 – Present:** International Journal of Plant Physiology and Biochemistry
3. **2009 – Present:** World Journal of Microbiology and Biotechnology
4. **2009 – Present:** International Journal of Medicine and Medical Sciences
5. **2010 – Present:** Journal of Iranian Chemical Society (JICS)
6. **2010-Present:** Iranian Journal of Biology
7. **2011-Present:** Journal of Science, Khawrazmi University
8. **2012-present:** Cellular and Molecular Biotechnology Journal
9. **2012-present:** Iranian Biomedical Journal
10. **2016-present:** Journal of Process Biochemistry
11. **2016-present:** International Journal of Biological Macromolecules.
12. **2016-present:** PLOS ONE

XVII: Research Project Review

1. Aquacultures cell culture: anterior part of Hypophyse *Acipenser gueldenstaedtii*. 26/Feb/2009. Iranian Fisheries Research Organization, Tehran, Iran.
2. Investigation of *Mnemiopsis leidyi* population genetic using molecular method in the Caspian Sea. 27/May/2009. Iranian Fisheries Research Organization, Tehran, Iran.
3. Examining the biotransformation of phenolic substrates to ortho-dihydroxy compounds by the trapped tyrosinase into the solid phase. June/2009. National Institute of Genetic Engineering and Biotechnology, Tehran, Iran.
4. Identification sex marker in Beluga (*Huso huso*) and Persian sturgeon (*Acipenser persicus*) by using of molecular techniques. Iranian Fisheries Research Organization – International Sturgeon Research Institute.
5. Purification and characterization of β -lactamases from clinical isolates of salmonella spp. Research Center of Gastroenterology & Hepatology Diseases.

XVIII: Awards Received

1. 2003. Biotechnology Awards; Biotechnology Congress.
2. 2003. 11th student year Book Awards.
3. 2006, Distinguished Top Ph.D student in Biochemistry, University of Tarbiat Modarres, Tehran, Iran.

4. 15th student year Book Awards.
5. 2010, International Foundation for Science Grant (IFS) Grant.
6. 2012, Iran National Science Foundation (INSF) Grant.
7. 2012, International Foundation for Science Grant (IFS) Second Grant.
8. 2012, Certificate of appreciation from NIGEB Biotechnology Incubator.
9. 2013, Top Researcher at National Institute of Genetic Engineering and Biotechnology (NIGEB).
10. 2015, Top Teacher at National Institute of Genetic Engineering and Biotechnology (NIGEB).
11. 2015, a member of Top Ten in NIGEB.
12. 2015, the world academy of sciences (TWAS) Grant.
13. 2018, a member of Top Ten in NIGEB.

XIX: Research Projects (Finished & Running)

No	Project Title	Position	Location	From	To
1	Genetic Variation Within and Among Rainbow trout	Co - Executive	Tarbiat Modarres University (Finished)	2001	2003
2	Industrial enzymes	Co - Executive	Tarbiat Modarres University (Finished)	2002	2006
3	Production of Biological Product "Chitinase" from Micro-organisms in Shrimp Farming Wastewater	Executive	NIGEB Grant No: 325 (Finished)	2008	2009
4	Biochemical characterization of efficient chitinase-producing indigenous bacterial strain isolated from shrimp farming ponds	Executive	NIGEB Grant No: 365	2009	2010
5	Obtaining More Juice from Row Fruits and Improving the Efficiency of Instruments in Industrial Fruit Juice Factories	Co - Executive	Shahrood University of Technology (Finished)	2010	2011
6	Functional Genomics of an Extermophile Chitinase Isolated from Shrimp Pond	Executive	International Foundation for Science Grant No: 388 (Finished)	2010	2011
7	Purification, and investigation of biological and physicochemical properties of Serratia marcescens B4A chitinase	Executive	NIGEB Grant No: 404 (Finished)	2011	2012
8	Investigation and achievement of a bacteriocin in order to biocontrol of Bacterial Citrus Canker	Executive	NIGEB Grant No: M 406 (Finished)	2011	2013

9	Site directed mutagenesis in <i>Serratia marcescens</i> B4A antifungal chitinase gene in order to enhancement of stability	Executive	Iran National Science Foundation Grant No: 453	2012	2014
10	Purification and Biochemical Characterization of Thermostable Chitinase from <i>Cohnella A01</i> and its Biocontrol Potential	Executive	International Foundation for Science Grant No: 463 (Finished)	2012	2014
11	Cloning, expression and purification of recombinant thermophilic amylopullulanase from <i>Cohnella A01</i>	Executive	NIGEB Grant No: 473	2013	2015
12	Biochemical characterization of recombinant thermostable protease	Executive	NIGEB Grant No: 524	2015	2016
13	Determination of substrate specification, proteolytic resistance and the type of recombinant thermostable protease for food industries	Executive	NIGEB Grant No: 584	2016	2017
14	Heterologous expression of indigenous thermophilic cellulase	Executive	TWAS Grant No: 586	2016	2017
15	Increasing of Hyaluronic acid production of <i>Lactobacillus acidophilus</i> ATCC 4356 via metabolic engineering and optimization of culture conditions	Executive	NIGEB Grant No: 642	2017	2018
16	Heterologous Expression, Product Optimization, Biochemical Characterization and Antifungal activity of Thermostable CelC307 Cellulase	Executive	International Foundation for Science	2018	2020
17	Extraction of Anti pollution peptides from Moringa seeds	Executive	NIGEB Grant No: T110	2018	2019

XX: INTERNATIONAL/NATIONAL GRANTS

1. Functional Genomics of an Extermophile Chitinase Isolated from Shrimp Pond. International Foundation for Science. **Swedish: 10,000 USD.**
2. Purification and Biochemical Characterization of Thermostable Chitinase from *Cohnella A01* and its Biocontrol Potential. International Foundation for Science. **Swedish: 12,000 USD.**
3. Site directed mutagenesis in *Serratia marcescens* B4A antifungal chitinase gene in order to enhancement of stability. Iran National Science Foundation. **150,000,000 Rial.**

4. Heterologous expression of indigenous thermophilic cellulose. The world academy of sciences (TWAS): **5,000 USD**. TWAS is based in Trieste, **Italy**.
5. Heterologous Expression, Product Optimization, Biochemical Characterization and Antifungal activity of Thermostable CelC307 Cellulase. Iran National Science Foundation. **200,000,000 Rial**.

XXI: Press Interview

6. Plasma program; Radio Javan; winter 2008: Industrial Enzymes.
7. Ettelaat Newspaper; 1/ Dec/2008: Pectinolytic Enzymes.

XXII: Research Interest

Covers a range of topics related to Biotechnology, Biochemistry, Enzyme Technology, Bioremediation, Biological production of Industrial enzyme, Biodegradation of hazardous wastes, Environmental Biotechnology, Different Aspects of Molecular Biology of Microorganisms and Veterinary & Fisheries Biotechnology.

XXIII: Supervised Student Thesis

Ph.D Thesis:

1. Zarei, M. Dec. 2010. "Production of Biological Product "Chitinase" from Micro-organisms in Shrimp Farming Wastewater". Faculty of Marine Sciences, Khorramshahr Marine Sciences and Technology University, Khorramshahr, Iran.
2. Mirzayi, S. "The effect of non-starch polysaccharides on intestinal enzyme activity and performance of layer hens". Department of Animal Science, Faculty of Agriculture, Tehran University, Karaj, Iran.

M.Sc Thesis:

1. Keshavarz, M. Sept. 2010. "Production, Purification, and Characterization of Chitinase from Native Bacterial strain." Biotechnology Dept., Islamic Azad University. Tehran, Iran.
2. Babashpour, S. Sept. 2010. "Cloning and Expression of Chitinase Gene from a Native Bacterium." Biotechnology Dept., Islamic Azad University. Tehran, Iran.
3. Aliabadi, N. Dec. 2010. "Isolation of thermostable chitinase – producing bacterial strain from Shrimp farming Pools and biochemical characterization of the efficient chitinase". National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.
4. Mortazavi, M. "Cloning and expression of thermophilic chitinase gene". Biotechnology Dept., Sahed University. Tehran. Iran.
5. Abiri, N. "Purification of thermophilic chitinase from a native microorganism and investigation of it's kinetically parameters for the purpose of inhibiting the growth of plant pathogens fungus." Biotechnology Dept., Islamic Azad University. Karaj, Iran.
6. Abazari, N. "Isolation, production, and characterization of a pectinase from plant pathogens." Biotechnology Dept., Islamic Azad University. Karaj, Iran.
7. Soezi, M. "Designing and construction of recombinant pPIGFP plasmid expressing HIV-1." National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.

8. Adibzadeh, N. "Isolation and subunit characterization of collagen from the body wall sea cucumber *Holothuria*." Marine Biotechnology Dept., Islamic Azad University. Tehran, Iran.
9. Asareh, R. "Isolation and characterization of native cellulose-degrading bacteria. Faculty of Agriculture. Payame Noor University. Tehran, Iran.
10. Gholami, D. "Possible of achievement to bacteriocin which controlling citrous canker disease bacteria. The University of Sistan & Baluchestan graduate school. Biochemistry. Zahedan, Iran.
11. Emroozi Z" Study of S390I and G191V mutations in *Serratia marcescens* B4A Chitinase gene with Quik Change Site Directed Mutagenesis method for enzyme stability improvement. National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.
12. Poureidy B." Cloning and expression of lipase from thermophilic Indigenous *Cohnella* sp. National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.
13. Amini Y." Cloning and expression of thermophilic (1->3)-(1->4)-beta-D-glucan 4-glucanohydrolase (Coh02511), from *Cohnella*-A01. Islamic Azad University. Pharmaceutical Branch Advanced Science & Technology Faculty
14. Goharipour A. "Cloning, expression and Biochemical Characterization of Amylopullulanase Coh01136." Kharazmi University, Faculty of science.
15. Zebardast F. "Cloning, expression and Biochemical Characterization of Amylopullulanase Coh0831". Payam Noor University, Karaj Branch.
16. Fahimi E. "Production, Purification and Study of M. phaseolina polygalacturonase Inhibitors" Shahrood Industrial University. Faculty of Agricultural Biotechnology.
17. Hajiyani F. "Comparative modeling of a β -Galactosidase from *Cohnella* A01 and performing in silico point mutation for increasing thermal stability and catalytic activity.
18. Shafiei S.M. "Cloning, expression, purification and partial biochemical characterization of the laccase enzyme of native strain of thermophilic bacterium *Cohnella* sp. A01."
19. Karimi Z. "Heterologous expression of superoxide dismutase from thermophilic bacterium *Cohnella* sp. A01."
20. Afraz S. "Heterologous expression of a pectate lyase from *Cohnella* sp. A01."
21. Javaheri Z. "Isolation, screening and identification of cyanide resistant bacteria and study of partial biochemical characterization of bacterial degrading enzyme".
22. Saghiyan R. "Heterologous expression of protease 1759 from thermophilic bacterium *Cohnella* sp. A01."
23. Mohammadi S. "Heterologous expression of Cellulase from thermophilic bacterium *Cohnella* sp. A01."
24. Banaeian S. "Characterization of beta 1,3 glucanase isolated from *Cohnella* sp. A01.
25. Characterization of thermophilic Amylopoulolanase isolated from *Cohnella* sp. A01.

XXIV: Advisor Student Thesis

Ph.D Thesis:

1. Esamaeilipour, O. "Effects of xylanase enzyme and diet acidification on the performance, nutrient digestibility and characteristics of gastrointestinal tract of

- broiler chickens in wheat base diets.” Department of Animal Science, Faculty of Agriculture, Tehran University, Karaj, Iran.
2. Mohiti, M. “Effects of Dietary Fibers and Protein on Performance, Gut Morphology and Fat Metabolism in Broiler Breeder Hens”. Department of Animal Science, Faculty of Agriculture, Tehran University, Karaj, Iran.
 3. Pornour, M. "The study of dopamine receptors and Catechol amine-O-methyl transferase genes expression changes and their pharmacogenetic effect on apoptosis in breast cancer patients. National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.

M.Sc Thesis:

1. Vesagh, Z. "Recombinant protein generation against canis sperm." National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.
2. Tabatabayi, M. "Heterologous expression of *canis familiaris* AKAP4." Shahid Bahonar University of Kerman. Faculty of Agriculture. Department of Animal Science.
3. Mohammadi, F. "The association between MMP-7(-181 A:G) genotypes with the risk of multiple sclerosis." Islamic Azad University. Pharmaceutical Branch Advanced Science & Technology Faculty.
4. Khaleghinejad S. H. "Investigation the effect of substitution Phe¹⁷ with Ser on enzyme activity in chimeric *Bacillus thermocatenulatus* Lipase." University of Zabol, Faculty of Science, Department of Biology.
5. Kazemzadeh S. "Study on the interaction of fungi with plant pathogenic bacteria for its biocontrol." Shahrood University of Technology, Faculty of Agronomy and plant Breeding.
6. Paydarzadeh M. "production of polyclonal antibody against of *Xanthomonas citri* subsp. *Citri*. National Institute of Genetic Engineering and Biotechnology. Tehran, Iran.
7. Valiollahi P. "Study of recombinant amylopullulanase coh4159 from *Cohnella*" Payam Noor University, Karaj Branch.
8. Rezaei M. "Partial Biochemical Characterization of β -glucanase isolated from native thermophilic bacteria *Cohnella* sp. A01" Kharazmi University, Faculty of science.
9. Dejam Z. "Mitochondrial Proteomics Study of High Oleic and Low Oleic Iranian Olive Germplast. Islamic Azad University, Science and Research Branch, Tehran.
10. Tarrahi M. "Heterologous expression of protease 1147 from thermophilic bacterium *Cohnella* sp. A01."
11. Malmir N. Screening and Isolation cyanide resistance fungal and cloning of cyanide degrading enzyme.

XXV: Sabatical Student

1. Zahroojian N. Ph.D. of Animal Biotechnology. 2017-2018.

XXVI: Bacterial Registration

1. PTCC 1908 *Bacillus* sp. MO1 strain (affiliated to *Bacillus subtilis* group); Isolated from soil, Moute Gold Mine, Isfahan Province, Iran. Used for degradation of Cyanide. Medium of growth: Nutrint broth/agar (PTCC2), Incubation temperature 37 °C, Aerobic, Risk group: 1
2. PTCC 1909 *Enterobacter* sp. ZS strain. Isolated from soil, Moute Gold Mine, Isfahan Province, Iran. Used for degradation of Cyanide. Medium of growth:

- Nutrint broth/agar (PTCC2), Incubation temperature 37 °C, Aerobic, Risk group: 2
3. PTCC 1921 *Cohnella* sp. A01 strain; Isolated from shrimp farming pond, Choebdeh region, Abadan, Khuzestan Province, Iran. Medium of growth: Nutrint broth/agar (PTCC2), Incubation temperature 50 °C, Aerobic, Risk group: 1

XXVII: Gene Registration

1. *Cohnella* sp. strain A01 superoxide dismutase gene, complete cds. Accession: KX857493
2. *Cohnella* sp. A01 laccase gene, partial cds. Accession: KP724697.1
3. *Cohnella* sp. A01 amylopullulanase (Coh00831) gene, partial cds. Accession: KP335161.1
4. *Cohnella* sp. A01 amylopullulanase (Coh01133) gene, partial cds. Accession: KP335160.1
5. *Cohnella* sp. A01 glutamine amidotransferase gene, complete cds. Accession: MF683464.1
6. *Cohnella* sp. A01 intracellular protease gene, complete cds. Accession: MF683463.1
7. *Cohnella* sp. A01 amylopullulanase gene, complete cds. Accession: KX013443.1
8. *Cohnella* sp. A01 beta-glucanase gene, complete cds. Accession: KX013442.1
9. *Enterobacter* sp. ZS 16S ribosomal RNA gene, partial sequence. Accession: KU609073.1
10. *Bacillus subtilis* strain M01 16S ribosomal RNA gene, partial sequence. Accession: KR996794.1
11. *Cohnella* sp. A01 beta-galactosidase gene, partial cds. Accession: KM016464.1
12. *Cohnella* sp. A01 endo-1,6-beta-D-glucanase gene, complete cds. Accession :KU058957.2
13. *Cohnella* sp. A01 lipase 3646 gene, complete cds. Accession :JX833623.1
14. *Aspergillus awamori* strain K-03 18S ribosomal RNA gene, partial sequence. Accession: KF922319.1
15. *Geobacillus* sp. enrichment culture clone RA-155 16S ribosomal RNA gene, partial sequence. Accession: JQ083172.1
16. *Enterobacter* sp. DGH3 16S ribosomal RNA gene, partial sequence. Accession: JX308306.1
17. *Cronobacter* sp. DGH1 16S ribosomal RNA gene, partial sequence. Accession: JQ999984.1
18. *Paenibacillus* sp. A01 chitinase gene, complete cds. Accession: JQ675723.1
19. *Geobacillus* sp. enrichment culture clone RA-555 16S ribosomal RNA gene, partial sequence. Accession: JQ083173.1
20. *Chryseobacterium* enrichment culture clone RA-M137 16S ribosomal RNA gene, partial sequence. Accession: JQ083171.1
21. *Bacillus* sp. enrichment culture clone RA-137 16S ribosomal RNA gene, partial sequence. Accession: JQ083170.1
22. *Bacillus* sp. enrichment culture clone RA-455 16S ribosomal RNA gene, partial sequence. Accession: JQ083168.1
23. *Cohnella* sp. A01 16S ribosomal RNA gene, partial sequence. Accession: JN208862.1
24. *Serratia marcescens* strain B4A chitinase gene, complete cds. Accession: HM473183.1

25. *Serratia marcescens* strain B4A 16S ribosomal RNA gene, partial sequence.
Accession: HM535665.1
26. *Bacillus* sp. enrichment culture clone RA-436 16S ribosomal RNA gene, partial sequence. Accession: JQ083169.1